Mini Zipline

Overview:

Get ready to make your toy fly!

Use your STEM skills to make a fun zipline. Ask an adult to help you with this activity.

What you need:

- Cord or wool
- Scissors
- Egg carton
- Small toy
- Paper clip

Instructions:

1 Make a harness for your toy

1. Cut one egg pocket out of an egg carton. Ideally it will have some room on the four corners to tie on some wool or cord.

2. Carefully make small holes in the four corners of the egg carton pocket. Cut two equal lengths of string or wool to about 24 cm. Thread the wool/string in the holes opposite each other and tie knots underneath the pocket so it doesn't fall out.

3. Bring the middle of your wool pieces together and attach a paper clip. Insert your lego person or toy into the egg pocket.

2 Make your zipline

4. Find some cord or wool for your zipline. If your cord is smooth the zipline will go faster (it will have less friction).

5. Tie one end of your zipline onto a high point such as a door handle. Tie the other end of the cord onto a lower point (e.g. the bottom of a chair).

3 Make your toy fly

6. Hook the paper clip of the harness onto the high point of your zipline. Let go and watch your toy fly!

See our slideshow to watch our mini zipline in action and see how to make the harness: https://docs.google.com/presentation/d/1M_fQg2zU-jOi-moxwNBGjNqZX8PlCVAu5co-0PJr4LB-w/edit#slide=id.p1

Try your own design:

Experiment with different designs of harness. Try longer lengths of zipline and changing angle from the high point to the low point of your zipline. We first tried making a wool zipline, but the wool wasn't very slippery and slowed down the toy. Which changes make it go faster?